



Early Journal Content on JSTOR, Free to Anyone in the World

This article is one of nearly 500,000 scholarly works digitized and made freely available to everyone in the world by JSTOR.

Known as the Early Journal Content, this set of works include research articles, news, letters, and other writings published in more than 200 of the oldest leading academic journals. The works date from the mid-seventeenth to the early twentieth centuries.

We encourage people to read and share the Early Journal Content openly and to tell others that this resource exists. People may post this content online or redistribute in any way for non-commercial purposes.

Read more about Early Journal Content at <http://about.jstor.org/participate-jstor/individuals/early-journal-content>.

JSTOR is a digital library of academic journals, books, and primary source objects. JSTOR helps people discover, use, and build upon a wide range of content through a powerful research and teaching platform, and preserves this content for future generations. JSTOR is part of ITHAKA, a not-for-profit organization that also includes Ithaka S+R and Portico. For more information about JSTOR, please contact support@jstor.org.

GEOGRAPHICAL NOTES.

GEOGRAPHICAL SPELLING.—If, as Dogberry says, to write and read comes by nature, it is at least quite certain that nature does not know much about spelling, as applied to geography. There is so far but one recognized principle which seems to be followed with some steadiness; and that is, to adopt the native orthography for names of places in countries which use the Roman alphabet.

This principle is applied to all the Western Continent, to all Europe, with the exception of Russia, the Balkan States, Turkey, and Greece, and to many of the European colonies.

The countries which still use some form of the Gothic character come under this rule, for the reason that the Gothic is not a true character, but a mere distortion of the Roman form. Every sound represented by a Gothic letter is represented equally by the corresponding simpler Roman letter, and the manifest disadvantage of keeping up a distinction which is no distinction is so great that German and Danish and Swedish scholars have gone over, almost in a body, to the side of common-sense and the Roman alphabet.

Exceptions to the general principle just stated will occur to every one; but they are all concessions to long-settled habit.

There is no reason, logical or sentimental, why Roma,

Firenze, London, Edinburgh, New York, München, Wien, and Lisboa should not be written unaltered in every language that uses the Latin alphabet. The foreign name is sure to be incorrectly pronounced in any case, but it might always be correctly and uniformly written and printed; and this would be no slight gain. To introduce uniformity of practice in this matter among most of the Europeans and all of the Americans is in the power of the first nation that sets the example.

It is less easy to deal with names written in the Greek or the Russian character; but the difficulty lies not so much in finding what Latin letters shall represent a given Greek or Russian letter as in agreeing upon the value of the combined letters; whether, that is, they shall be given their German, or their French, or their English value. There is as yet no tribunal to settle this question, or the still more difficult one of how to arrange, for the use of those who employ the Latin alphabet, a system that shall render the Oriental names and sounds in a spelling recognized by all.

To attempt too much would be to fail; but an entirely practicable reform lies within reach. This is to establish rules by which those who write in English shall be guided in spelling the names of strange places, so that all those who read English shall be able to pronounce them in the same way.

One or two examples, taken at random from the "Gazetteer," will show what is the existing confusion in this matter.

Ha-Noi, in Annam, is known also by the following names: Ketho, Kesho, Cachao, Kecho, Cacheo, and Bakthian, and Baktean. All these forms are found in English books.

Voronezh, a well-known Russian city, is found in English under these additional shapes: Voronej, Voroniej, Voroneje, Voronetz, Woronetz, and Woronesch.

As matters now stand the traveller or reader has no authority to guide him, either in spelling or in pronunciation.

The Royal Geographical Society adopted in 1885 a system, intended to supply the want of an English standard for the orthography of names not written, in the countries to which they belong, in the Roman character. The rules laid down in this system are in part excellent, but they might be improved by a thorough application. Exceptions are out of place in a radical reform.

The rules adopted are:

1.—No change to be made in the spelling of names in countries which use Roman letters.

2.—No change to be made in the spelling of names familiar by long usage to English readers, though belonging to languages not written in the Roman character: as Calcutta, Cutch, Celebes, Mecca.

3.—The true sound of the word as locally pronounced to be taken as the basis of the spelling.

4.—An approximation, however, to the sound is alone aimed at.

5.—The broad features of the system are that vowels are pronounced as in Italian, and consonants as in English.

6.—One accent only is used, the acute, to decide the syllable on which stress is laid.

7.—Every letter is pronounced. When two vowels come together, each one is sounded clearly, however rapidly.

8.—Indian names are accepted as in Hunter's "Gazetteer."

In detail these rules are as follows :

a—*ah*, *a* in *father* ; Java, Banána, Somáli, Bari.

e—*eh*, *e* in *benefit* ; Tel-el-Kebir, Otétch, Yezo, Medina, Levúka Peru.

i—English *e* ; *i* as in *ravine* ; the sound of *ee* in *beet* ; Fiji, Hindi.

o—*o* as in *mote* ; Tokio.

u—long *u* as in *flute* ; the sound of *oo* in *boot* ; Zulu, Sumatra.

All vowels are shortened in sound by doubling the following consonant : Yarra, Tanna, Mecca, Jidda, Bonny.

Doubling of a vowel is only necessary where there is a distinct repetition of the single sound : Nuulúa, Oosima.

ai—English *i* as in *ice* ; Shanghai.

au—*ow* as in *how* ; Fuchau.

ao—slightly different from above ; Macao.

ei—is the sound of the two Italian vowels, but is frequently slurred over, when it is scarcely to be distinguished from *ey* in the English *they* ; Beirút, Beilúl.

b—English *b*.

c—is always soft, but is so nearly the sound of *s* that it should be seldom used ; Celebes. If *Celebes* were not already recognized it would be written *Selebes*.

ch—is always soft as in *church* ; Chingchin.

d—English *d*.

f—English *f* ; *ph* should not be used for the sound of *f* ; Haifong, Nafa.

g—is always hard (soft *g* is given by *j*) ; Galápagos.

h—is always pronounced when inserted.

j—English *j* ; *Dj* should never be put for this sound ; Japan, Jinchuen.

k—English *k* ; it should always be put for the hard *c* ; Korea.

kh—the Oriental guttural ; Khan.

gh—is another guttural as in the Turkish Dagh, Ghazi.

l
m
n } —as in English.

ng—has two separate sounds, one hard as in the English word *finger*, the other as in *singer* ; as these two sounds are rarely employed in the same locality, no attempt is made to distinguish between them.

p—as in English.

q—should never be employed ; *qu* is given as *kw* ; Kwangtung.

r
s
t
v
w
x } —as in English ; Sawákin.

y—is always a consonant, as in *yard*, and therefore should never be used as a terminal, *i* or *e* being substituted. Thus, not Mikindány, but Mikindáni ; not Kwaly, but Kwale.

z—English *z* ; Zulu.

Accents should not generally be used, but where there is a very decided emphatic syllable or stress, which affects the sound of the word, it should be marked by an *acute* accent : Tongatábu, Galápagos, Paláwan, Saráwak.

The second rule is clearly wrong. Who is to decide what is meant by long usage ? The words given as illustrations fall readily and properly into their places when spelled : Kalkutta, Kutch, Mekka, Selebes.

The third and fourth rules are in reality but one, and might, even then, be suppressed. It is, in any case,

only an approximation to the true name that can be made; for where no common standard exists, what certainty is possible? The speaker is one, as the Arab says, and the hearer is another; some men articulate badly in speaking, and others have a dull sense of hearing. What becomes of the true local pronunciation in such cases? The eighth rule, establishing Hunter's "Gazetteer" as the authority for the spelling of Indian names, is no rule at all, for it brings the student face to face with a dilemma like the famous one in the story of the Alexandrian Library. Either the "Gazetteer" agrees with the rules, and then it is superfluous; or it contradicts them, and then it is pernicious.

The system, it ought not to be forgotten, is intended to establish principles for the guidance of the English-speaking peoples; and it should carry with it its own explanations. There should be no place in the alphabet for diphthongs like those given, *ai*, *au*, *ao*, *ei*. The one sufficient rule has been already laid down, that every vowel is to be pronounced. The letter *c* should be thrown out as unnecessary. *Celebes* should be written *Selebes*, and *Comoro*, *Komoro*. Practice, moreover, should go with precept. The letter *y*, it is said, is always a consonant, and must not be used as a terminal; but the name *Bonny* appears among the examples, a few lines above. Consistency in practice has also its value. Why should *Mikindány* be corrected *Mikindáni*, and *Kwaly* be made *Kwale*? The terminal *i* is surely sufficient.

It falls properly to the Royal Geographical Society to perfect the work, of which it has made so good a beginning.

THE UNITED STATES OF AMERICA.—The American Geographical Society is constantly receiving communications with the address:

“New York,

“United States of *North* America.”

It ought to be known by this time, in most parts of the civilized world, that there is no such country.

The name of the American Union is the one given at the head of this note, and to thrust in the word *North* is to betray a lack of the elementary information, supposed to be general in these days of geographical study.

London, it may be well to say, is not in “England of Europe,” nor is Berlin in the “German Empire of the North.”

DIVISIONS OF THE SOUTHEASTERN U. S.—Mr. Gilbert Thompson, of the U. S. Geological Survey, suggests, in a communication to the Philosophical Society of Washington, the adoption of designations corresponding with the topographical features of the sections in the Southeastern States of the Union.

In this Appalachian region, he says, the drainage does not afford the best unit for the purposes of the physical geographer. There is, however, a remarkable line known as the “fall-line,” the natural boundary of a division. Every river in the Eastern United States, south of New England, ceases to be rapid as it nears the sea and becomes broad and slow-moving. Where this change takes place, there is usually a fall or rapid.

This is always the lower limit of water power and often the upper limit of navigation, and it is the natural seat of cities and towns of importance. In its northern portion it is at the head of tide, and it nowhere exceeds 200 feet in altitude.

From the fall-line to the sea is a region with a gentle slope, traversed by slow-moving rivers and fringed at almost a dead level by deltas, swamps, and everglades.

This region Mr. Thompson, with courage worthy of a better cause, entitles the "*coastal* plains," including as subdivisions the Atlantic plains and the Gulf plains.

The area bounded by the fall-line, the Mississippi and Ohio, and a part of the drainage divide of the Laurentian lakes, he calls in a broad sense the Appalachian region, and divides it into three distinct sections.

From the Ohio southeastward, and from the Mississippi eastward, the country gradually rises to 2,500 feet above the sea, and is then cut off by an escarpment facing to the southeast and about 1,200 feet in height. This plateau Mr. Thompson proposes to call the "Cumberland plateau." It is a table-land deeply cut by a system of ramifying drainage. At the north the surface is somewhat rolling, and the plateau ends at the south in long finger-like spurs. The streams generally rise near the edge of the escarpment and flow toward the northwest. The Potomac, however, flows eastward, and the New and the Tennessee rivers flow westward.

From the Cumberland plateau eastward to the eastern foot of the Blue Ridge is the "Appalachian region," definitely so called. This is characterized by long, narrow mountain ridges, closely parallel, and sinking to the rank of hills in the great valley which traverses the region from north to south. At the north the principal mountain area is west of this valley and the Blue Ridge is east of it. At the south the valley is close to the Cumberland plateau.

The third section is the "Piedmont region," an undu-

lating plain, with low spurs from the mountains and occasional isolated hills. The streams here are rapid and the topographic relief diminishes toward the fall-line.

Mr. Thompson's classification needs, most of all, a good commodity of names, for the burden laid upon the Appalachian region is greater than it can bear. The essential thing is to have one name for one region ; but any extended composition, in which Mr. Thompson's divisions were adopted as they now stand, would call for a perpetual commentary.

CHAMPLAIN CANAL.—*L'Esplorazione Commerciale*, of Milan, has information of a plan formed in the United States for a canal to unite the Hudson and the St. Lawrence rivers by way of Lake Champlain. This canal, it is thought, will permit ships to pass directly from New York to Montreal, and will enable them to avoid the difficult and dangerous navigation of the Gulf of St. Lawrence, and the ascent of the great river. It will allow ships of 1,000 tons to go from New York to Chicago through the great lakes, Michigan, Erie, and Ontario, so that Chicago, distant though it be from the ocean, will become a seaport. The great inland city, which has already sent cargoes of grain direct to Liverpool, may receive the news of its coming sea-change with calmness ; but the people of New York, with whom it is an article of faith that the Champlain Canal was finished in the year 1822, will wait with some impatience for more precise details from Milan, where it has been found necessary to print the notice of this enterprise in two separate numbers of *L'Esplorazione Commerciale*.

The unassisted American intellect finds itself bewil-

dered in attempting to grasp the idea of a plan which places Lake Erie to the east of Lake Ontario and Lake Ontario itself far to the west of Lake Michigan, and forgets to speak, even in a disrespectful way, of Lake Huron.

It is, perhaps, not irrelevant to remind the Milanese geographical journal that the Tagliamento is not the outlet of the Lago di Como, and that it were in vain to look for the Lago di Garda to the northwest of Lago Maggiore.

THE SOURCES OF THE MISSISSIPPI.—The Minnesota Historical Society, of St. Paul, on the 13th of December, 1886, ordered an investigation of the claim put forward by Capt. Willard Glazier to the discovery of the source of the Mississippi, and now publishes the report of the Hon. James H. Baker on the subject.

This report is less than complimentary to Capt. Glazier, and the Society, after adopting it, passed several resolutions, one of which reads :

“*Resolved*, That we call upon the various geographical, historical, and other learned societies throughout the world to join with us in repudiating Glazier’s claims, and ask them, in the spirit of right and truth, that if they have in their possession maps with the lake in question so named (Lake Glazier), they erase Glazier’s name from them and substitute therefor that of “Elk Lake.”

KOSMOS.—The first number of this handsome monthly was issued at San Francisco, February 1, 1887, by the Kosmos Publishing Co., C. Mitchell Grant, F.R.G.S., editor.

Kosmos is the official organ of the Geographical Society of the Pacific, and contains, besides the Report of the Society’s Annual Meeting, a paper on “Mt. St. Elias,” by Mr. Seton-Karr, who accompanied Lt. Schwatka’s expe-

dition, and one by Prof. George Davidson, on the "Submarine Valleys of the Pacific Coast." Prof. Davidson marks three of these valleys. The first, off Shelter Cove, 30 miles S. of Cape Mendocino, is 100 fathoms deep at its head, $1\frac{1}{4}$ miles from shore, and 25 fathoms at the rocks almost under the cliffs; but where it breaks through the marginal plateau the depth reaches 400 fathoms. The sides of this valley are very steep.

Midway between this and Point Gorda is a minor submarine valley of from 300 to 150 fathoms deep; and immediately N. of the point a very deep valley comes in from the W.S.W. and heads close to the shore. The head of this second valley is $\frac{1}{3}$ of a mile from the shore— $40^{\circ} 18' 30''$ N. Lat. The depth of 100 fathoms in the valley is only $1\frac{1}{2}$ miles from shore, and the sides are remarkably steep. The opening through the 100-fathom plateau is 520 fathoms deep.

A little nearer to Cape Mendocino is the third valley, which comes in from the W. The depth of 100 fathoms in this is only $\frac{1}{3}$ of a mile outside of the regular 25-fathom coast line, and five miles S. by E. from Cape Mendocino light-house. The 450-fathom sounding in the entrance to this valley is $6\frac{1}{2}$ miles S.W. by S. from Cape Mendocino. The bottom is green mud.

Steam coasting vessels bound for Humboldt Bay, when they get as far as Shelter Cove in fogs, common on that coast, haul inshore to find soundings, and may be lost through ignorance of these deep valleys.

Through these, also, Prof. Davidson believes, the deep-sea fauna must be brought under the shores with the colder waters coming down the coast outside of the inshore eddy current to the northward.

LAKE MISTASSINI.—The Annual Report of the Geological and Natural History Survey of Canada, Vol. I., for 1885, gives the results of the exploration of this lake in 1884.

The lake is long and narrow, and lies N.E. and S.W., between 50° and $51^{\circ} 24'$ N. Lat., and $72^{\circ} 45'$ and $74^{\circ} 20'$ W. Lon. It is somewhat curved in shape, with the concave side towards the S.E. Its length in a straight line between the extremities of the N.E. and S.W. bays is nearly 100 miles, and the average breadth of the main body is about 12 miles. From end to end of the lake is a chain of rocky islands, almost like a ridge, dividing the water into two parts; and these islands so overlap each other as almost to cut off the view of the opposite shore from either side. From island to island the water is very shallow, but between the islands and the shore it is said to be everywhere deep.

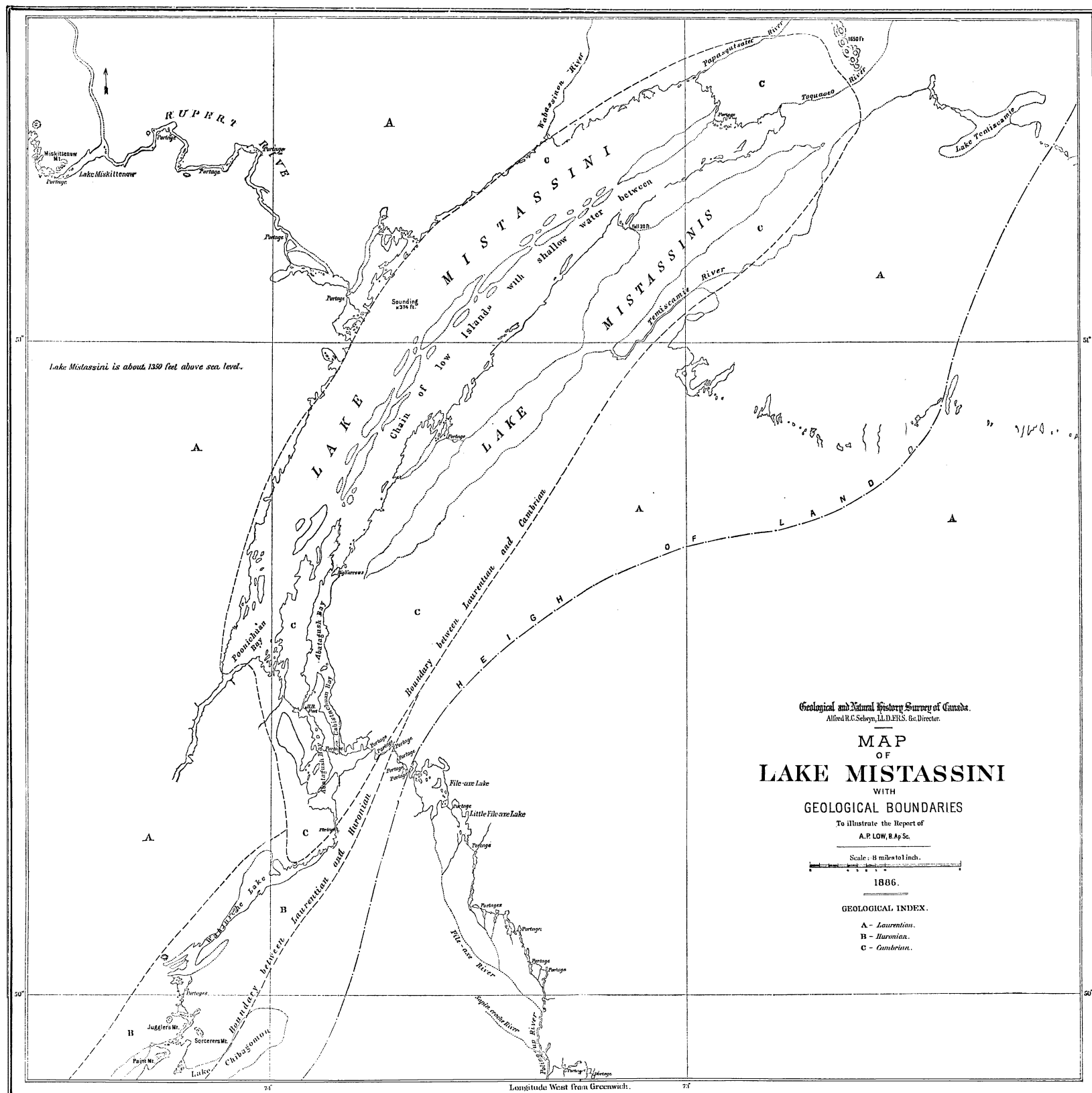
The two soundings reported gave 374 and 279 feet. The shore line is indented with bays, more numerous and more irregular in the western part.

Many streams flow into the lake, but the shores are mostly rocky, and without beach or marshes. The elevation above the sea is 1,350 feet.

The climate is severe, observations at the Hudson Bay Company's post in 1884 and 1885 showing that frosts occur in every month except July. At this post, the most favorable point for agriculture, some poor potatoes are raised; but the tops are always frozen before they reach maturity.

No timber of commercial value was found near the lake.

The waters of the Mistassini, as well as those of the adjoining large lakes, are full of fish, principally lake-trout, river-trout, white-fish, pike, pickerel, and suckers,



all of good size and fine quality. These fish are caught in great numbers by the Indians and by the Hudson Bay Company's people.

The Indians, about 125 in all, belong to the Mistassini tribe of the Algonkin family. They barter with the Company the skins and furs which they obtain during the winter ; but they depend for subsistence on the supplies furnished at the post, there being no deer in the country. Most of them can read and write the Cree character, and they all profess Christianity, though they mingle with it their old beliefs and practices.

A missionary visits them from Hudson Bay every two or three years to perform the ceremonies of marriage and christening. During his absences the church service is conducted by one of the Indians.

This report effectually disposes of the stories about the vast size of this lake, longer and wider, it was maintained until very lately, than Lake Superior itself. Its area is found to be in reality about one fifth that of Lake Ontario.

MEXICAN GEOGRAPHICAL SOCIETY.—It is gratifying to know that this society intends to resume the publication of its *Boletin*, which has been suspended since 1882. The volumes already printed are most valuable.

LAKE NICARAGUA AND THE CANAL.—Under this heading *Ausland*, of Stuttgart, gives in its number 52, for 1886, a portion of a study of the line for the projected Nicaragua Canal by Engineer Ronfaut. It is not said whether Mr. Ronfaut undertook his study for his own satisfaction, or on behalf of *Ausland*, or as the agent of some government or company ; and the matter is com-

paratively unimportant, in the presence of the study itself, which contains a really surprising amount of misinformation.

Mr. Ronfaut says the lake is ill-fitted for navigation, on account of the peninsulas, volcanoes, and rocks which fill it. In this opinion he is singular, and sets himself in opposition to the unanimous testimony of all the competent men who have studied the lake, and declare it to be a noble inland sea.

The trade-winds, he says, prevail for a part of the year, but there are complete calms of from two to five days' duration, followed by storms as terrible as those of the English Channel.

The facts are that the trade-winds blow almost throughout the year, from the east, northeast, and southeast during the dry season, and from the southeast in the rainy season. There is an occasional calm of a day or two, and sometimes, in June or October, the wind hauls to the southwest, with heavy rain for a week or ten days. This is the description of the weather given by all who have lived in Nicaragua, and notably by Dr. Earl Flint, of Rivas, who has been a resident of the country for thirty-five years. Dr. Bransford, a surgeon of the U. S. Navy, quotes, in the New York *Sanitarian*, of February 22, 1883, a memorandum of the U. S. Signal Office with regard to this region, as follows: "Exempt from hurricanes and whirlwinds, owing to the constant movement of air across the Isthmus from the trade-winds, although light in rainy season."

Mr. Ronfaut admires the scenery near Lake Nicaragua, but he says there is nothing to eat in the country, and that water is not to be had except by paying for it. With so

many storms as he describes there should be water ; and when he says there is nothing fit to eat he means, no doubt, nothing that seems to suit his own presumably peculiar tastes.

Other strangers in Nicaragua find beef, all kinds of vegetables, tropical fruits, sugar, chocolate, and coffee everywhere within reach at ridiculously low prices.

Timber, says Mr. Ronfaut, is abundant, but so costly, on account of the bad roads, that it is practically useless. The fact is that the internal communications in Nicaragua are fairly good. There are many and well-kept cart-roads, besides the lakes and the rivers. It is sometimes cheaper to use imported lumber at the seaports ; but everywhere else the excellent native wood can be had for the mere cost of cutting it.

The question of health is an important one. Mr. Ronfaut says that the climate of the Pacific coast is unfavorable to Europeans, that San Juan del Sur is in especially bad repute, that the valley of the San Juan river is deadly and fever-stricken, and that Greytown is one of the most unhealthy ports of the western world.

Dr. Bransford, the surgeon already quoted, says : "There are, of course, to be expected malarial troubles, but in few States of the Union are the lowlands free from the same class of diseases. . . . The strong and almost constant movement of the air in this section prevents that stagnation which, in a damp, tropical country is accompanied by accumulations of malarial poison."

Dr. Bransford was in Nicaragua with a surveying party of forty-five, many of them seamen, a proverbially reckless class, for $6\frac{1}{2}$ months in 1872-73.

The average roll was 36. There was no death. One

officer had a sun-stroke, and there was one case of chronic dysentery, contracted before the patient joined the expedition. There was a marked absence of the bowel complaints for which the tropics are noted; and the natives were found to be remarkably healthy.

Dr. Bransford says in conclusion what the experience of so many confirms: "He is convinced that most of the cases of fearful mortality recorded of expeditions in the tropics were the results of gross ignorance and carelessness. Men cannot live in Central America as they would in New York, nor can they live in New York as they would at the North Pole."

Not every one visits Central America or the North Pole, but all men live through the year, and no one of them pretends to live in summer as he does in winter.

It may be satisfactory to Mr. Ronfaut to read what Dr. Bransford says of the deadly Greytown: "On the beach near Greytown, but away from the quarters, should be established a hospital, which would be an excellent sanitarium at certain seasons for men who break down, working inland."

Mr. Ronfaut is quite certain that earthquakes would shatter and dislocate the locks and the bed of a canal in Nicaragua. He would be a bold man who should set a limit to the power of earthquakes; and it is true that Nicaragua does not seem to be more exempt from these convulsions than most other portions of the earth's surface. Does Mr. Ronfaut know of any region in which engineering works are safe from the disturbing operations of natural forces?

The earthquake of Sept. 6, 1882, which was so destructive at Panama, has left no traces in Nicaragua; but if

Mr. Ronfaut's theory of earthquakes is correct it is his duty to explain why the blackened and weakened ruins of Granada, in Nicaragua, burned during Walker's foray in 1855, are still standing as they stood then.

The evidences of an imagination, overheated, possibly, by the dread of fever and of wild beasts, abound in Engineer Ronfaut's narrative. He discovered sharks in Lake Nicaragua; and he evidently mistook the marks of weathering on the houses of Managua for cracks made by earthquakes. Throughout Nicaragua there are to be found many stone dams, indigo vats, and other structures in stone and rubble, built during the Spanish domination and in perfect condition at this day.

Mr. Ronfaut has gloomy forebodings with regard to the future of Nicaragua. He asserts that the level of the lakes is sinking rapidly, and that the day is not far distant when they will be dried up. The river San Juan, he says, is becoming less and less navigable and must before long cease to exist.

This melancholy state of things is due, he conceives, to two causes: the rapid destruction of the forests, and the porous nature of the volcanic soil, through which the water of the lakes runs as through a gigantic sieve.

Mr. Ronfaut's sympathetic nature does him infinite credit, but the case is, perhaps, less hopeless than he thinks. He has told us that the people of Nicaragua live upon bananas and have no industries. It is not easy to understand how, under such circumstances, the forests of the country should be cut down, more or less rapidly; and it seems to contradict all known natural laws that Lake Nicaragua should ever have come into existence in a soil which cannot hold water.

Mr. Ronfaut's reasoning, or his memory, or both, may be at fault. The people who live in Nicaragua know nothing of the ruin that awaits them. The wharves built by the Spaniards on the shores of the lake are in use to-day, without any noticeable change in the depth of water; the extreme rise and fall of Lake Nicaragua, within the range of four to five feet from the end of the dry season to the end of the rainy season, has remained unchanged from 1850, when the first accurate surveys for a ship-canal were made by Col. Childs, to the present time; and the careful gaugings of the river San Juan, made at corresponding dates during these thirty-seven years, fail to show any diminution or marked fluctuations in the volume and flow of its waters.

No intelligent person, acquainted with the fact that the San Juan is the only outlet of a water-shed of 2,400 square miles, will expect to see it disappear.

The clearing of the harbor at Greytown and the construction of proper works there and at Brito present no unusual difficulties, and call for no extraordinary outlay of funds.

COMMANDER TAYLOR ON THE NICARAGUA CANAL.—In *Petermanns Mittheilungen*, Band 32, No. 11, Commander Taylor is made to say that the chief superiority of the canal by way of Nicaragua over the Panama Canal consists in the absence of calms on the Pacific at the terminus of the former. A careful re-reading of Commander Taylor's address in this Society's Bulletin No 2, for 1886, will show that the notice in the *Mittheilungen* omits several of the points established by him and, so far, fails to do him justice.

The address made it clear :

That the cutting of the Nicaragua Canal presented no unusual engineering problem ;

That the canal could be made, on the most liberal estimates, for \$75,000,000 ;

That the revenue of the canal, on a moderate estimate of the shipping both ways, and at the average rate paid on the Suez Canal, would yield a return of sixteen per cent. on the total capital invested, after deducting cost of maintenance and working expenses ;

That the great fresh-water lake gave to the route through Nicaragua a ready-made water-way of ninety miles in length, an inexhaustible reservoir, harbors, and anchorage grounds for the fleets of the world, ample sites for depots, dock-yards, coaling stations, storehouses, and hospitals on the lofty islands, and, always ready, a natural, effective, and inexpensive remedy for the fouling of ships' bottoms ;

That vessels entering the Pacific from the Nicaragua Canal would not be delayed by calms.

ARGENTINE REPUBLIC.—The Argentine government has just established in Paris, London, Berlin, Vienna, New York, Brussels, and Berne, bureaux for the purpose of furnishing gratuitously every kind of information concerning the Republic, its laws, resources, condition, progress, commerce, finances, and industries.

Each bureau is provided with a library of publications, official and private, besides maps, views, plans, etc., and the principal journals of Buenos-Aires and other cities ; and will maintain, also, a permanent exhibition of the products, natural and manufactured, of the country.

Dr. D. F. King has been appointed director in charge of the New York Bureau.

CARTOGRAPHY OF THE EGYPTIAN SOUDAN.—Under this heading *Le Mouvement Géographique*, of Brussels, publishes in the number of Jan'y 30, 1887, on the somewhat doubtful authority of the *Bosphore Egyptien*, the following story:

When the English army took possession of the citadel at Cairo, the maps, plans, and military archives there found were transported to the building occupied by the Bureau of Accounts for the Soudan. Here they were classified and catalogued.

Last June Gen. Hallam Parr, finding the rooms in which these documents were kept to his liking, gave directions to Maj. Mantell, who was in charge of the maps and plans, to give up his rooms and to take advantage of the occasion, when he moved, to destroy all the useless papers. Maj. Mantell ordered, in consequence, and carried out the complete destruction of the greater part of the documents entrusted to his care.

This is an almost irreparable loss, many of these maps covering former Egyptian provinces which are now inaccessible. The collection having been disposed of, the head of the department suppressed the division of "Maps and Plans," provided for in the budget, and effected in this way a retrenchment, if not a reform.

Le Mouvement Géographique adds that its own private advices confirm the story told by the *Bosphore Egyptien*, incredible as such an act of vandalism seems, when reported of an English officer.

Some idea of the treasures thus lost to geographical

science may be had by looking through the summary, elsewhere given, of the explorations made, principally by American officers, under the direction of Stone-Pasha, Chief-of-Staff of the Egyptian army; and these formed but a part of the collection in the citadel of Cairo.

FERNANDO Po.—In the *Bulletin* of the Paris Geographical Society, M. L. Janikowski gives some curious particulars about the island of Fernando Po, which lies in the Bight of Biafra, at about 20 miles from the mainland. Being but 3° N. of the equator, the island enjoys a healthful climate, which is due to its great elevation. The extreme length from N. to S. is but 35 miles, and the breadth 14, while the interior is a mass of mountains, of which the loftiest, known to the English as Mt. Clarence, and to the Spaniards as Isabel, rises to the height of more than 10,000 feet.

Less than fifty years ago it was in the power of the English, who must occasionally regret having allowed it to slip from them into the hands of Spain. M. Janikowski praises the beauty and the fertility of the island, which produces coffee, cacao, quinquina, every variety of fruit, and a great many medicinal plants, besides a number of very virulent poisons.

The natives, who should know best, call each other Boobis, a word equivalent in their language to *friends*. They number about 30,000, and their manners and customs are, to say the least, original. In their own villages they dispense with clothing, other than the shell bracelets and necklaces of which they are very fond; but when they enter the town of Sta. Isabel they add a cloth or skin apron. They are great hunters, and have a military

organization of their own, by means of which they enforce a rude justice throughout the island. There are three classes, the lowest, a middle class, and a privileged, or patrician, class, to which any *Boobi* may be chosen who can give a great dinner with abundant brandy and palm wine. When the feast is over, the guests solemnly elect their host a *butuku*, or noble.

The religion of this singular people resembles nothing so much as what is popularly called spiritualism. There are no temples, no fetiches, no images. The people come together in a grotto, of which there are many in the island, and seat themselves in profound silence. All at once, a voice cries: "Now, I open the window," and a bright light from above fills the grotto, and the priest is seen standing in front of the people. Each one, in turn, approaches with his offering and asks for an answer to his question: whether he will have good luck on his voyage, whether his father was not poisoned, and so on. The priest turns to the wall and puts the question to the *oomo*, or great spirit, in a peculiar tongue. He then falls to the ground in a kind of convulsion, and a loud voice cries out some words, which are the answer, as interpreted by the priest. An English negro, who was present on one of these occasions, told M. Janikowski that the *oomo* asked him in good English what he wanted. He replied that he wished to know something about the death of his father; and the answer came to him at once, with some details concerning his family.

Marriage is a simple affair. If a girl pleases the eye of a rich man, he sends an agent to throw a shell necklace over her neck, and she is won without more ado.

Poor men are obliged to make several visits to the

parents, leaving always a present, and one day the girl is told to get up and go to the lover's house. Here she is received by an old woman, and the marriage is made.

Family ties are not very strong. M. Janikowski tells of an only son whose mother died, leaving him a house and some small debts. The son refused to pay the debts, and was brought before the Spanish court by the creditors. When asked where he was born, and the names of his parents, he denied any knowledge of them; and being reminded that he had just buried his mother, he declared that the dead woman was not his mother but a stranger, with whose debts he had no concern. "In that case," said the judge, "what right have you in her house? You must leave it at once, and it must be sold to satisfy her creditors." "Oh! no," cried the man, "now that I remember, the deceased was my mother, and I will pay."

M. Janikowski affirms that this case is but one of many which prove the lack of natural affections among these people. It is not surprising, under these circumstances, to learn that poisons are habitually employed to remove wives and children and husbands, who persist in living.

When a death occurs, all but the nearest relatives leave the house. The poor are buried without any ceremony or attendance. The body of a *butuku*, or rich man, is dressed in his best—gigantic round hat, bracelets, and all. The wall of the house is then broken down, and the body is taken out through the opening and into the forest, where a deep hole has been dug, covered at the bottom with bags of rice, in the middle of which is placed a semi-circular seat taken from a canoe. Here the body is made to sit with the hands on a tree set up immediately before it. The earth is then thrown in, amid the discharge of fire-

arms; and the tree, projecting above the ground, marks the place of the grave.

It has been said that the island is, on the whole, a healthy place, but it has its diseases, and to one of these M. Janikowski gives the mysterious English name of *yellow gender*.

To a race of self-confessed Boobis any kind of grammatical distinction may very well seem to be nothing less than a visitation of God; but other men find it difficult to form a conception of a yellow gender, or a purple declension, or a crimson syntax.

M. Janikowski is, probably, not familiar with spoken English. The name he heard and ought to have written was, undoubtedly, *yellow jaundice*.

THE SHARPLESS PORTRAITS.—The facts concerning these portraits cannot be too widely known, since it equally concerns all men, whatever their special pursuits may be, to aid in defending and maintaining the integrity of historical records and monuments.

A few years before the death of Washington an English painter, named Sharpless, visited America and made many portraits, chiefly in crayon, of prominent persons, including Washington and his wife. Some of these portraits were carried by the painter to England, but two undoubted works of his—profiles of Washington—have long been known here.

In 1882, three pictures, a profile and a full face of Washington and a profile of Lady Washington, were exhibited at the Boston Art Museum as the work of Sharpless.

In 1886 these portraits were again placed on exhibition

in Boston, and it was hoped that the government might purchase them.

Under these circumstances the Massachusetts Historical Society appointed a committee, of which Mr. Francis Parkman, the historian, was chairman, to inquire into the authenticity of the paintings.

The committee reported on the 13th of January, 1887 :

That the profile likeness exhibited bore no resemblance whatever to the two genuine Sharpless profiles of Washington ;

That the full face represented a man in the prime of life, whereas Sharpless never saw Washington till he was an old man, and did not paint his portrait till 1796, only two (?) years before his death ;

That when the portraits were on exhibition in 1882, it was observed that the eyes of Washington were brown, and that those of Lady Washington were blue. When the pictures returned to America in 1886, the eyes of Washington were found to be blue, and those of Lady Washington brown.

The explanations offered on these points by Major Walter, the Englishman who exhibited the portraits, did not satisfy the committee.

The evidence as to the genuineness of these "inestimable treasures" was a pamphlet by Major Walter, containing letters, the originals of which were said to be no longer in existence. The most important of these were: a letter bearing the signature of Washington, extracts from letters ascribed to Sharpless, and a letter signed by Robert Cary, Washington's London agent not long before the Revolution.

Cary's letter was found to bear a startling resemblance

to a well-known passage of a speech delivered in 1814 by Charles Phillips, the Irish orator; while the letter of Washington and the Sharpless extracts displayed a familiarity, little less than miraculous, with Major Walter's own cast of mind and inadmissible English. As with Washington and Sharpless, so with many others—Gallatin, Trumbull, Cadwallader Colden, Washington Irving, Emerson, and Hawthorne. Each of these, individual and recognizable elsewhere, yielded up character and language and intellect at the touch of Major Walter's omnific hand. It overtakes even the resources of classic Latin to express his merit :

Nil tetigit quod non *majoravit*.

GAZETTEER OF THE BRITISH ISLES.—This Gazetteer, edited by Mr. John Bartholomew, F.R.G.S., and published by Adam and Charles Black, Edinburgh, is a marvel of compactness and thoroughness.

The two questions which first occur to any one who consults a gazetteer for information respecting a place are, as Mr. Bartholomew says : “ Where is it ? ” and “ What of it ? ” ; and it would not be easy to name any place in the United Kingdom concerning which this volume is silent.

The wealth of illustration by means of maps is ample.

There are maps and charts giving the Heights of Land and Depths of Sea, the Temperature, Rainfall, River Basins, and Tides; Vital and Industrial Maps, showing the Density of Population, the Birth and Death Rates, the Industries and their Distribution, the Arable and Pasture Lands, etc.; Parliamentary and Railway Maps, besides the General Maps of each kingdom, and one

showing the Light-houses on all the Coasts ; and the appendices contain a great body of valuable statistics.

The typographical execution of the work is worthy of its intrinsic merit.

GEOGRAPHY AT OXFORD.—A Readership in Geography has been endowed by the University of Oxford for the next five years, with an annual stipend of £300 to the Reader. So far as is known, this is the first definite recognition of the study of Geography by a College or University, among the English-speaking peoples ; and it was eminently fit that Oxford should lead the way.

A SITE FOR AN OBSERVATORY.—Prof. Edward C. Pickering, Director of the Harvard College Observatory, calls attention to the will of the late Uriah A. Boyden, by which property, now exceeding two hundred and thirty thousand dollars in value, was left for the purpose of astronomical research “at such an elevation as to be free, so far as practicable, from the impediments to accurate observations which occur in the observatories now existing, owing to atmospheric influences.”

The fund has been turned over to Harvard College, and the proposed researches will be made under the general management of the Observatory attached to it, and aided by its means, in addition to the fund itself.

For the new permanent Observatory a very great altitude will be advisable, in a position easy of access, and where the station can be occupied at all seasons of the year. A location in the Southern Hemisphere will be preferable. Southern stars, invisible in Europe and the United States, have been less observed than the northern

stars, and by the aid of a southern station investigations can be extended upon a uniform system to all parts of the sky. Information is asked for regarding suitable localities and should give the following details :

1. Latitude and longitude. Distance and direction from a town or well-known point. Height, and how determined.

2. Peak, pass, or table-land. Character of surface : ledge, broken rock, gravel, or covered with trees, shrubs, or grass. Prevalence of snow in summer, and period during which snow in winter might obstruct access, or occasion inconvenience or damage. Proximity of wood and water.

3. Means of access, distance from and height above nearest railroad station, wagon-road, bridle-road, or foot-path. Time of ascent and descent. Nearest post-office and telegraph-station, and distances from station. Nearest point of road kept open in winter.

4. Observation of rainfall at different seasons. Proportion of sky covered with cloud at different hours and seasons. These observations are desired at sunset, sunrise, and late in the evening. Observations may be made of a distant mountain peak, evening observations being confined to moonlight nights. Observation of barometer and thermometer desired. Information wanted regarding the prevalence of very high winds ; the presence of dust, haze, or smoke from forest fires, rendering distant points invisible ; and all meteorological phenomena affecting the value of the station for astronomical purposes. Duration of rainy or cloudy season, if any ; and regular recurrence of clouds, thunder-storms, or wind at any given hour of the day.

5. Sketches or photographs of the proposed location, and of points on the road ; also of the view.

Correspondence to be addressed to Prof. Pickering, at Cambridge, Mass., U. S. A.

RELIEF OF EMIN PASHA.—Twelve years ago Dr. Schnitzler, an Austrian physician and scientist, entered the Egyptian service as Emin Bey, and was made surgeon-general under Gordon, then Governor of the Egyptian Soudan.

To his extensive scientific acquirements Emin Bey added remarkable gifts as a linguist, and he showed, in his relations with the people, and especially in three delicate and dangerous missions to native chiefs, so much tact and discretion that Gordon appointed him, in 1878, Governor-General of the Egyptian Equatorial Provinces.

These provinces, to which Dr. Felkin generously ascribes an extent little less than that of Europe, were in any case very large. Emin Bey established posts at forty principal points, constructed roads, introduced the regular cultivation of useful plants, maintained peace and order, and began the instruction of the people in the arts of civilization.

Communication with his government was cut off early in 1883 by what English authorities call the rebellion of the Soudan.

Emin Bey had then with him but two European companions, both experienced African travellers, Dr. Junker, a Russian scientist, and Capt. Casati, formerly an officer in the Italian army.

When the English campaign in the Soudan came to a disastrous end, it was supposed that all signs of the Egyptian domination in that remote territory had disappeared; but late in 1886 Dr. Junker suddenly returned to the outer world with the news that Emin Bey and Ca-

sati were shut up, with their faithful negro soldiers, in Wadelai, one of the fortified posts on the Nile, about fifty miles from the northern end of Lake Albert Nyanza. Mahehi, a post on the lake itself, is possibly still held by Emin Bey ; and he had on the lake last summer two steamers, besides four iron life-boats, each capable of containing sixty men.

A private expedition was immediately organized in London for his relief. It was aided by a grant of £10,000 from the Egyptian government, which at the same time promoted the much-enduring Austrian to the rank of Pasha.

Mr. Stanley, the most competent of men for the task, left London on the 21st of January for Zanzibar to take charge of the expedition. He engaged in Egypt and in Eastern Africa a large force of guards and porters, besides a body of sixty Soudanese soldiers.

With these he reached Cape Town on the 9th of March, and left the next day for the Congo, where he expected to arrive by the 18th.

From the mouth of the Congo to the Albert Nyanza is not less than 2,400 miles, and of these 900 must be made by land. The daily march in such an unknown country can hardly amount to 10 miles, and it will be wonderful if the expedition comes in sight of the lake before the 1st of August.

Can Emin Pasha hold out till then ? That is the question ; and there is no one who can answer it.

The situation is so like that of Gordon at Khartoum that men naturally fear the worst. There has been, at least, no delay in the present instance, and Stanley will do every thing that can be done by a leader ; but he may arrive too late, though a telegram of March 14th from

Zanzibar reported Emin Pasha well on the 24th of January. He had made an ineffectual effort to reach the coast, and had been forced to return to Wadelai.

NORTH ATLANTIC CURRENTS.—A report presented to the French Academy of Sciences on the 10th of January, 1887, gives the results of the Prince of Monaco's experiments on the Atlantic currents, in the years 1885 and 1886. The experiment of 1885 has already been noticed in the *BULLETIN*. The floats thrown into the sea on that occasion, near the Azores, numbered 169, of which 14 were recovered, showing a drift in a S. E. direction, at the rate of 3.83 miles per 24 hours.

In 1886, 510 floats were sent out much nearer to the French coast.

Nine of these have been found in positions showing also a S. E. drift, with velocities varying from 5.80 to 6.45 miles.

These experiments have not greatly added to our knowledge of ocean currents.

TO THE NORTH POLE BY LAND.—Col. Gilder has given up for the present his attempt to reach the North Pole by way of Hudson Bay. He now intends to take the next Hudson Bay boat, or a whaling-vessel, and to join his companion Griffith at Nottingham Island, and renew his effort.

An expedition very similar to Col. Gilder's has been begun by Mr. Alexander McArthur, who left Winnipeg on the 13th of February to push to the northward along the west coast of Hudson Bay, and through King William Land and Boothia to Grinnell Land. Mr. McArthur proposes to be gone three or four years.

RAINFALL ON THE LAND OF THE GLOBE.—In the *Scottish Geographical Magazine* for February, 1887, Mr. John Murray has a paper on the rainfall of the globe and its relation to rivers. The elaborate tables given by Mr. Murray bring together at a glance the results of an immense amount of work.

He estimates the total rainfall at 29,350 cubic miles, of which 2,243 cubic miles fall on the inland drainage areas, such as the Caspian, the Sahara, and the like. These inland areas occupy 11,486,350 square miles, and correspond in locality very closely with the rainless regions of the earth—those, that is to say, in which the annual rainfall is less than 10 inches. The area of these regions is 12,200,000 square miles. The inland drainage areas, the rainless regions, and the great desert regions largely coincide, and are situated in two belts around the world, one in the Northern Hemisphere, nearly between latitudes 30° and 40°, the other in the Southern Hemisphere, nearly between 20° and 30° of latitude.

The primary cause of the rainless, desert, and inland drainage areas is to be traced to the fact that they are situated where the winds blow from colder to warmer latitudes, and from off land, and not from the ocean.

None of the rain falling on the inland drainage areas ever reaches the sea by means of rivers. There are left, therefore, 44,211,050 square miles of land which drain into the ocean. Of these, 26,400,000 drain into the Atlantic or its tributary basins, and of the 27,110 cubic miles of rain that fall on the land draining into the oceans, 15,788 cubic miles, or more than half, fall on the Atlantic area.

The Pacific drainage area receives 5,007 cubic miles,

and that of the Indian Ocean 4,379 cubic miles, while the rain and snow falling on the Antarctic continent are estimated at 1,688 cubic miles.

The proportion of rainfall on a river basin to the amount of water discharged at its mouth varies according to the geographical position of the river. In European rivers, between a third and a fourth of the rainfall reaches the sea. The Mississippi discharges one fourth of the rain it receives *into the Caribbean Sea*, a performance which displays, on the part of the river or of Mr. Murray, a wholly unexpected contempt for the acquired rights of the Gulf of Mexico.

One half of the rainfall on the basin of the Yukon finds its way to the ocean.

In tropical or sub-tropical rivers the average discharge is about one fifth of the rainfall, though the Nile, it must be noted, delivers only $\frac{1}{37}$ of the amount received.

The figures relating to some of the great river-basins are interesting.

The Amazon, with an area of 2,229,900 square miles, receives 2,833 cubic miles of rain. The Congo comes next with 1,540,800 square miles, and 1,213 cubic miles; then the Nile, with an area of 1,293,050 square miles and a rainfall of 892 cubic miles; then the Mississippi, with 1,285,300 square miles, and 673 cubic miles of rain; and the La Plata, with 994,900 square miles of area, and a rainfall of 904 cubic miles.

The composition of river water has been estimated by Mr. Murray from the analysis of 19 rivers. According to these each cubic mile of river water that reaches the sea carries with it 762,587 tons of matter in solution and suspension. The 6,524 cubic miles carried into the ocean

every year take with them, therefore, no less than 4,974,967,588 tons of solid matter.

THE LONGEST RIVER.—A posthumous paper by Dr. G. A. Von Klöden, published in the *Zeitschrift* of the Berlin *Gesellschaft für Erdkunde*, vol. 20, part vi., gave the length of 376 rivers in different parts of the world, calculated in kilometres. According to this, the longest river was the Nile, with 6,470 kilometres, and the next the Mississippi-Missouri, with 5,882 kilometres.

The Russian general, Von Tillo, revising these calculations, gives the first place to the Mississippi-Missouri, with 6,750 kilometres, and the second to the Nile, with the 6,470 kilometres assigned it by Von Klöden.

The two authorities agree as to some other great rivers. To the Ta-Kiang, or Yang-Tse-Kiang, they give 5,083 kilometres, to the Amazon 4,929, to the Yenisei-Selenga 4,750, to the Congo 4,640, to the Mackenzie 4,615, and to the Amoor 4,378.

After these come, according to Von Klöden, the Cambodia with 4,240 kilometres, the Ob with 4,229, the Hoang-Ho with 4,192, and the Lena with 4,036.

The difficulties in the way of exact measurement are so many that there must always remain some uncertainty as to the relative figures.

THE NAME OF CELEBES.—According to the *Bulletin* of the Lille Geographical Society, Mr. Van Hoëvell, Dutch Assistant-Resident at Gorontalo, says that the European navigators gave to Celebes the name it now bears from the words *Sooloo besi*, in order to distinguish it from the other Sooloo islands. The word *besi* (written *bási* in

Craufurd's dictionary) means *iron*, and the western coast of Celebes is rich in this metal.

The descent from *Sooloo besi* to the present form is easy enough, and the etymology so far recommends itself, though the process by which it is reached is depressingly like that which has given us, among other wild guesses, the derivation of Canada from *Acá nada*, and California from *Calida fornax*.

THE RIVERS OF EASTERN EUROPE.—M. Venukoff, in a recent study on the Russian rivers, shows that the problem of maintaining them in a navigable condition is very similar to the one presented by the rivers of the United States. The two principal obstacles to be met in both cases are, the closing of the rivers by ice in the winter, and the breaking up in the spring.

In Western Europe, the Rhine, the Thames, the Seine, or the Loire, may be covered with ice once in ten or fifteen years, for five or ten days; very rarely, for three weeks.

In Russia, on the contrary, all the rivers, excepting those of Transcaucasia, are closed every year for several weeks or months. M. Venukoff gives from M. Rykatcheff's work a table showing the number of days during which navigation remains open on the following rivers:

Dwina, at Archangel	.	.	182 days.
“ at Veliki-Ustiug	.	.	202 “
Neva, at St. Petersburg	.	.	222 “
Volkhov, at Grusino	.	.	221 “
Düna, at Dunaburg	.	.	243 “
Niemen, at Grodno	.	.	256 “

Bug, at Brest-Litovsk	254 days.
Dnieper, at Kiev	270 “
“ at Krementschug	275 “
“ at Kherson	282 “

Kherson, it must be remarked, is in the latitude of Nantes, where the Loire never freezes, and Kiev is almost due east from Coblentz, where the Rhine is sometimes, though rarely, frozen for a very few days.

Comparisons between the rivers of Western and Eastern Russia show that the time of open navigation diminishes regularly towards the east, all other things being equal.

The force of the current is always to be taken into account since very rapid rivers often remain open even in high northern latitudes.

The melting of the ice in the spring is accompanied, in Russia, with peculiar dangers. Generally, the breaking up does not occur at the same time on the whole course of the river, especially when this flows with the meridian. The Volga, for instance, is free from ice at Astrakhan about the 16th of March, but remains bound till the 26th of April at Gorodetz, 2,300 kilometres up stream; so that the melting lasts through forty days. Moreover, the snows are so abundant that the thaw is always accompanied with tremendous freshets; and these shorten still more the period of navigation, especially on the two principal rivers of European Russia, the Volga and the Dnieper.

The freshets in the basin of the Volga are the most formidable, and observations show that at Samara the spring flood rises to twelve metres above the level of the frozen river, and that on the Oka, a branch of the

Volga, the difference between the winter and the spring level at Kaluga is but a fraction less than fourteen metres. In the west the freshets are comparatively mild, the Niemen and the Vistula never rising quite five metres above their ordinary level. In the west, it is observed, the melting is continuous even during the winter, while in the east it comes on all at once after a long period of intense cold.

OBITUARY.—A communication from the Geographical Society of Berne brings intelligence of the death, on the 22d of February, 1887, of Gustav Reymond-Le Brun, Chief Secretary of the Society and Editor of its Yearly Review. Herr Reymond-Le Brun was an indefatigable and conscientious worker, and his loss is deeply felt by his associates.

Dr. Gustav Kirchenpauer, presiding Burgomaster of Hamburg, and first President of the Geographical Society of that city, died suddenly in the night of the 3d-4th of March, 1887.

TITLES OF PAPERS IN GEOGRAPHICAL JOURNALS.

AARAN.—*Fernschau. Jahrbuch der Mittelschweizerischen Geographisch-Commerciellen Gesellschaft*, 1886.

Organization and Aims of the Society—Statutes—List of Members—List of Societies that Exchange Publications with the M. G.-C. G.—List of Donators—Yearly Account—Lectures and Exhibitions—A Visit to the Court of a West-African Negro King—On the Commerce and Industry of the Bâle Mission in India—Colonial Pictures

from Australia—How to Smooth the Way to a United Efficiency of the Swiss Museums—On the Reform of Geographical Instruction—On the First Extraction of Silver and Iron in Europe, Explained from the Names of Places in Asia Minor—The Names of the Oxus and the Jaxartes in the Mythical Geographical Description of the World in the Vishnupurâna—Practical Communications (on Library Matters)—On Manipulation of Bronze, from the Veda—The Oldest Mention of Stone-Coal in Europe—On the History of the Development of the Tulip Mania—Special List of Desiderata.

AMSTERDAM. — *Revue Coloniale Internationale*, Janv.—Fév., 1887.

On the Colonial Possessions of the Russian Empire—France in Northern Africa—* Colonial and Indian Exhibition, South Kensington—Review of Colonial Literature—* The Present State of the Ethnographical Section in the British Museum—Monthly Bibliography—Importance of the Countries on the Lower Danube with Regard to Colonial Politics—France in Northern Africa—French Colonies and Protectorates—German Protected Lands and Colonial Enterprises at the Beginning of 1887—* Colonial Tobacco in Amsterdam—Review of Colonial Literature—Monthly Bibliography.

Nederlandsch Aardrijkskundig Genootschap, Tijdschrift van het, 2de Ser., Deel iii., Afdeeling: No. 3, 9–10.

The Pane and Bila River Country in the Island of

* Articles marked with an * are in English.

Sumatra—The Nature, Climate, and Vegetable Productions of the Arctic Regions—Observations during My Residence in the Province of Pará—A Dutch Traveller on the Congo—Brief Account of the Netherlands Public Works in 1885—Geographical News of the Different Continents—Topographical Operations in Netherlands-India—Pretensions of the Mohammedans in British India—Dutch Expedition to the West Coast of Africa—New Britain: Land and People—Contributions to the Knowledge of the Water of the Well Zemzem at Mecca—Elephants in Borneo—Recent Volcanic Eruptions and Earthquakes—Reviews—Bibliography—Geographical Articles.

ANNAPOLIS, MD.—*U. S. Naval Institute, Proceedings*, No. 40.

Steel for Heavy Guns (Edward Bates Dorsey, C. E.)
—Discussion—Bibliographic Notes—Prize Essay for 1888.

BELFAST.—*Natural History and Philosophical Society, Report and Proceedings*, 1885–1886.

History and Legends of Some Irish Lakes—Eastern Reminiscences, Aden, India, and Burmah—New Bridge over the Firth of Forth—Wet and Dry Weather—A Recent Visit to Tory Island (N. W. Coast of Donegal).

BERLIN.—*Gesellschaft für Erdkunde, Verhandlungen*, Band xiii., No. 10.

Proceedings—Lectures and Memoirs—Communications—Notes on Geographical Matters—Reports of Other Geographical Societies in Germany—Contributions to the Library.

Deutsche Kolonialzeitung, 15 Dez., 1886–Feb. 1, 1887.

The German Colonial Union—The Bavarian Meeting of the German Colonial Union, at Munich—Communications from the Bureau of Information of the Union—Political and Geographical Events and News from the Colonies—Union for the Advancement of German Interests in South Africa—Literature—Editorial Correspondence—Pro Domo Sua—Bureau of the German Colonial Union—Agreement between the S. W. African Colonial Society and Herr von Lilienthal—Obituary: Dr. Karl Juhlke—Our Countryman, Emin Bey—Changes Wrought by Human Agency in the Flora of Chili—On the Construction of Houses for Europeans in the Interior of Africa—What is Deficient in the Present Colonization System?—The Interests of Germany in South Africa—Opening of the Royal Ethnological Museum in Berlin—Branch Societies—Communication from the Bureau of Information—Colonial Political Events and Geographical Progress—Boundaries in Eastern Africa—The German Position in Southern Brazil—Indigo—The German Colonists in Transcaucasia—Literature and Art—Editorial Correspondence—Meetings of the Bavarian Union—Heidelberg Branch—Berlin Division—Communications from the Bureau of Information—Regulations in Legal Matters for the Solomon Islands Belonging to the Protected District of the New Guinea Company—Extension of the German Protectorate in Southwest Africa—

Widening of the German East-African Company's Network of Stations—Further Colonization in German Southwest Africa—Conflicts in the Sooloo Islands—Enterprises for the Congo Free State—From the Niger Region—Return of Dr. Oscar Lenz—Relief of Emin Pasha—Apprehensions concerning Adolf Lüderitz—The German East-African Society's Expeditions, Stations, Factories, and Depots—Movement of the German Emigration from German Ports in 1886—Pictures from Liberia—German Life in Southern Brazil—Indian Coolies as Plantation Laborers in Ceylon—Literature—Correspondence.

BISTRITZ.—*XII. Jahresbericht der Gewerbeschule zu Bistritz in Siebenbürgen.*

Associations in Siebenbürgen in the 17th Century, together with Some Customs and Usages of the Guild of Coppersmiths—School Reports on the Condition of the Institute in 1885–1886.

BORDEAUX.—*Société de Géographie Commerciale, Bulletin*, Nov., 1886–Fév., 1887.

The New Line of the State Railroads, between Cagnac and Bordeaux—The Commercial Institutions of Hamburg—The German Exporting Agencies and the German Commercial Museums—Congress of French Geographical Societies at Nantes in August, 1886—Proceedings—A Steam-Launch Voyage on the Mekong River—Rain and Frost in the Gironde—M. Lagrange's *Cosmographie* (apparatus for showing the illumination of the earth's surface by the sun)—Pro-

ceedings—Industry, Commerce, and Agriculture in Persia—Telegraphic Cable on the West Coast of Africa—Geographical Notes—Proceedings—Importation of Lumber at Bordeaux—Soundings in the Garonne Maritime and the Gironde—Industry, Commerce, and Agriculture of Persia—The Tower of Cordouan—Transactions—Geographical Notes—Works Received—Colonial Expansion—Proceedings—Letter of M. Barbier on the Confusion Which Exists in Geographical Names.

BOSTON.—*Appalachia*, Dec., 1886.

Ascent of the Matterhorn—Camel's Rump and the Rangeley Lake Mountains—Heights of the White Mountains—Was Chocorua the Original Pigwacket Hill?—Mountain Meteorology—Odometer Measurements in the White Mountains—The Excursions of Our First Decade—Tenth Anniversary of the Appalachian Mountain Club—Proceedings.

BREMEN.—*Deutsche Geographische Blätter*, Band ix., Heft 4.

The Brazilian Province of Matto Grosso, from the Description of Dr. J. Severiano da Fonseca—Ethnological Contributions—On the Niger-Benue Region and Its Commercial Relations—The Eruption of Etna in May, 1886—The Results of the Exploration of the North Sea by the German War-Ship "Drache," in 1881, 1882, and 1884—Prof. Dr. O. Krummell in Kiel—Preliminary Contributions on the Scientific Results of the German Polar Stations—Smaller

Communications : Polar Regions, New Guinea, The Island of Réunion, Barbados, British Guiana, North Friesic Islands, From Siberia, Dr. G. Adolf Fischer, The Berri-Berri Disease (in Acheen), Steam-Lines between Europe and the Congo—Geographical Literature.

BRUSSELS.—*Société Royale Belge de Géographie*, Nov.—Dec., 1886.

Density of Population in Belgium and in Other Countries—Wilryck (a Commune near Antwerp)—Commercial Geography : Belgian Ports, South American Exports, Production of Beer, Silk Production, Se-Tchuen (Western China), Sierra-Leone — Geographical News — Transactions—Works Received.

Le Mouvement Géographique, 19 Déc., 1886, 13 Fév., 1887.

The Prisoners of the Soudan—Among the Bassongé—The Exploration of the Ubangi—Return of the Italian Mission from the Congo—Evacuation of Stanley Falls Station—News—The Island of Socotra—Obituary : Achille Galezot—German Commerce at Zanzibar—Death of Dr. Juhlke—Bibliography—Exploration of the Wellé by Dr. Junker—Sékoli-Bounga—The Prisoners of the Soudan—How the *Journal des Débats* Writes History—News—Second Visit to Mirambo—Geographical Record—Great Enterprises—Statistics—Commerce and Industry—Bibliography—The Netherlands Indies—To the Help of Emin-Bey—The Independent State on the Congo—The Swedes on the Congo—

News—Life in Africa—Geographical Record—Statistics—Scientific Societies—Dr. Junker in the Heart of Africa—Emin-Pasha and Stanley's Expedition—The Simplon Tunnel—The English Channel Tunnel—Chicago, a Seaport—Population of Alsace-Lorraine—The Italians at Home and Abroad—Population and Commerce of Australasia—Catalan Chart—Map of the Heavens—Cartography of the Egyptian Soudan—German Africa—Netherlands-India—Geographical Notes and News—The Stanley Expedition for the Relief of Emin-Pasha—Dr. Junker on the Wellé—The Region North of the Congo—The Congo Free State—Geographical Chronicle—Societies.

BUDAPEST.—*Société Hongroise de Géographie*, Tome xiv., Fasc. 7–10, Tome xv., Fasc. 1.

The Upper Longitudinal Valley of the Ingour (Caucasus)—The Waters in the Alföld (lowlands) of Hungary—The Society at the National Exhibition of 1885—Bibliography—Lake Fertő and Its Environs (Western Hungary)—Report on the Sixth Congress of German Geographers, at Dresden, in April, 1886—Bibliography—Transactions—The City of Vác (Central Hungary)—In Macedonia—The Geographical Exhibition at Dresden—Transactions—Brief Communications—Notes of a Voyage to Siam—The Canadian Federation—The New Map of Africa (Habenicht's)—Historical Geography of Hungary—Bibliography—Transactions.

BUENOS AIRES.—*Instituto Geográfico Argentino*, Tomo vii.—Tomo viii., No. 1.

Exploration in Southern Patagonia—Bulletin of the National Department of Agriculture—Acts and Proceedings of the Institute—Data Relating to the Navigation of the N. Coast of the Gulf of Saint George (E. Coast of Patagonia)—Chronicle—Bulletin of the National Department of Agriculture—Proceedings.

CAIRO.—*Société Khédiviale de Géographie, Bulletin*, 11e Série, No. 9.

Journal of a Voyage from Cairo to Keneh, Berenice, and Berber, and of the Return by the Desert of Korosko, by Col. R. E. Colston.

CHICAGO.—*The American Antiquarian*, Jan., 1887.

The Indians of Puget Sound—Village Life and Clan Residences Among the Emblematic Mounds—Eyay Shah : a Sacrificial Stone near St. Paul—Correspondence—Editorial—Notes on American Ethnology—Notes from the Far East—Notes on European Archæology—Literary Notes.

DOUAI.—*Union Géographique du Nord de la France, Bulletin*, Juillet–Octobre, 1886.

The Great Northern Canal—Penal Colonization in a Corner of New Caledonia—The Western Coast of Mexico and Central America—The Mission of the Congo—Transactions and Report of the Union—Obituary : Abel Desjardins.

EDINBURGH.—*Scottish Geographical Magazine*, Jan.–Feb., 1887.

Anniversary Address — Palestine : The Land and

the People as They Are—Configuration of the Clyde Sea-Area—Fâ-Hien's Travels in India—Notes on Place-Names of Iona—Total Annual Rainfall on the Land of the Globe and the Relation of Rainfall to the Annual Discharge of Rivers—Black and Mediterranean Seas—Place-Names of Iona—Early Scottish Geography—Obituary Notes—Proceedings—Geographical Notices.

FLORENCE.—*Sezione Fiorentina della Società Africana d'Italia, Bullettino*, Vol. ii., Fasc. 8.

The Schools at Massowah and Assab—For Our Colonies on the Red Sea—Notes on Capt. Casati—The Congress for the Encouragement of German Interests beyond Sea, Sept., 1886—Obituaries: G. A. Fischer and Karl Jühlke—Massowah—Robecchi and Antonelli—Remains of the Porro Expedition—Italian Mission to Goggiam—Junker, Emin-Bey and Casati—The Italian Consul in Madagascar—Italian Colonists in Griqualand—Lieut. Bove.

GENEVA.—*L'Afrique Explorée et Civilisée*, Jan., 1887.

Monthly Intelligence—Emin-Bey, Junker, and Casati—Correspondence: from Loanda—Bibliography.

GOtha.—*Petermanns Mittheilungen*, Bde. 32; No. 12; 33, No. 1.

The Exploration of the Ulanga River—Preliminary Information on the Expedition for the Finding of Dr. Junker—The Last Famine in India and Its Influence on the Movement of the Population, after the Official Census Reports—Studies of

the North-African Coast—On the Language—Map of German Austria—A General Map of Central Europe—Laterite Out-Croppings in Banka—Geographical Report for the Month. Literature.

HAGUE, THE.—*Bijdragen tot de Taal-Land-en Volkenkunde van Nederlandsch-Indië*, 5de Volg., 2de Deel, 1te Aflevering.

In Memoriam: J. J. Meinsma—The West Coast of Sumatra from 1819 to 1825—Javanese Phrases—Some Communications about the Buginese of Koti (in Borneo).

HALLE ^A/_S—*Verein für Erdkunde, Mitteilungen*, 1886.

Storms in Middle Germany—Further Additions to the Observations on the Geographical Expansion of the Mammalia of Japan—Revision of the Existing Treaties between Germany and Japan—Use-Jura and Usaramo, Ukhutu, Usagara, and Ugogo (East Africa)—Area of the Basin of the Saale and Its Tributaries—Inroad in the Old Elbe at Cracow—Morphological Character of the Hartz Mountain—Proceedings and List of Members.

HAVRE.—*Société de Géographie Commerciale, Bulletin*, No. 6, 1886.

Gees, 1848–1886 (Obituary Notice of M. Gees, Founder and President of the Society)—Eight Days at Hamburg—New Caledonia—Works and Publications Received.

LILLE.—*Société de Géographie, Bulletin*, Janvier, 1887.

List of Members—Minutes of Meetings—Distribution of Prizes—Volapük, the Universal Commercial Language—Geographical News.

LONDON.—*Nature*, Jan. 6–Feb. 10, 1887.

Historical Geology—Red Sunsets and New Zealand Eruptions—Colonial and Indian Exhibition—Ipecacuanha Cultivation in India—Tasmanian Fisheries—An Arctic Province (Alaska)—Botanical Federation in the West Indies (A Plea for Cultivation of Other Plants than the Sugar-Cane)—Tea-Planting in Ceylon—The Eskimo—Meteorological Conditions at the Time of the Eruption of Mount Tarawera—On the Morphology of Birds—The History of Howietoun (Establishment for Fish-Culture near Stirling, Scotland)—Long-Lost Reefs (in the Coral Sea, South of New Guinea)—Report of the Botanical Garden, Saharunpur (Hindustan, Lon. 77° 28' 8" E., Lat. 29° 57' 2" N.).

Royal Geographical Society, Proceedings, Jan.–Feb., 1887.

The Islands of the New Britain Group—Journey of the Expedition under Col. Woodthorpe, R. E., from Upper Assam to the Irawadi and Return over the Patkoi Range—Journey of Mr. J. T. Last from Blantyre to the Namuli Hills—The Late Dr. G. A. Fischer's Expedition for the Relief of Dr. Junker—Dragon Lake of Pamír—Explorations in South-Eastern New Guinea—Physical Geography of Japan, with Remarks on the People—Capt. Maitland's and Capt. Talbot's Journeys in Afghanistan—Journey in the Province of San Paulo, Brazil, in July–September, 1885—Geographical Notes—Correspondence—Obituary Notices—Reports and Proceedings.

LYONS.—*Société de Géographie, Bulletin*, Sept.—Dec., 1886.

Explorations and Geographical Labors of the Missionaries in 1884 and 1885—The French Possessions on the Slave Coast—Correspondence: The River Ogun, Letters from Australia and the New Hebrides—Transactions.

MADRID.—*Revista de Geografía Comercial*, Núm. 25 á 30, Julio–Setiembre de 1886.

Expedition to the Sahara—Outfit of the Expedition—Costa, Rio de Oro, and the Hamra—The Western Sahara—Collections from the Sahara and the Canaries—Other Expeditions: Sr. Toda in Egypt, Sr. Ossorio in Guinea, and the Return of Sr. Pastorin from Eastern Africa—General Department: Commerce in Rio de Oro, Commercial Policy, Spanish Chamber of Commerce at Tangier, The Study of the Arabic Language, Geographical and Colonial Record.

Sociedad Geográfica de—, Boletín, Set. y Oct., 1886.

The Canaries—Notes of a Journey through Morocco, the Sahara and the Sudan to the Senegal—On the Native States Existing in the Philippines at the Time of the Spanish Conquest—Excursions in Lower Egypt—Colonial Statistics—The Madrid Hurricane (May 12, 1886)—Important News from the Philippines—Miscellanea—Extract from the Transactions—Catalogue of the Library.

MARSEILLES.—*Société de Géographie, Bulletin*, No. 1, 1887.

The Expansion of Germany—The Pyrenees Seen from Marseilles—Travels and Voyages—Obituary—Bibliography—Notes.

MEXICO.—*Museo Nacional de México, Anales*, Tomo iii., Entrega 10a.

The Extinct Mammalia of the Valley of Mexico—
The Quinatzin Map (with Plate)—Appendix :
Method of Learning the Mexican Language, by
Fr. Andres de Olmos, 1547.

MILAN.—*L' Esplorazione Commerciale*, Dic., 1886.

Aid for Emin-Bey and Capt. Casati—Our Correspondence—The Possibilities of Commerce with Africa—The Region of the Lower Congo—On the Development of Africa—The Commerce in Mocha Coffee—Bibliography—Notes—Remains of Those Who Perished at Artu—Letters from the Harrar—German East-African Empire—German and British Convention concerning East Africa—Excursion to the Oasis of Siwah—Letter of Dr. G. Schweinfurt—Italian Possessions in Africa—Egypt—Commerce with Morocco in Genoese Damasks—Commerce of Panama—Lecture on Abyssinia—Notes and Miscellanies—Notes on Zanzibar.

MONTPELLIER.—*Société Languedocienne de Géographie*, Tome ix., 4e Trim., 1886.

The Ancient Springs of Montpellier—Fifteen Months among the Cannibals of the Upper Congo—Sketch of the General Revolt of Gaul, 51 B. C., according to Cæsar's Commentaries, with a Map of the Siege of Alesia—The Beginning and Causes of the German Colonization—Malacca Chronicle, Translated from the Malay—Brief Notices and Reports—The Camargue and Its Flocks—Geographical Notes—Proceedings—Works Received.

NAPLES.—*Società Africana d' Italia, Bollettino*, Nov.—Dec., 1886.

Italy at Massowah—Proceedings—Present State of Harrar—Africa through the Centuries—Licata's Africa—The Country of the Danakils—Notice of Captain Casati—Bibliography—Works Received—African News—Italy Abroad—Notes.

NEUCHÂTEL.—*Société Neuchâteloise de Géographie, Bulletin*, Tome ii., Fasc. 2.

Bolivia (Letters of a Swiss Traveller)—Notes on Travellers and Geographers Belonging to Neuchâtel—Publications Received.

NEW YORK.—*Science*, January and February.

Capture of Stanley Pool and Relief of Emin-Bey—Prisoners of the Soudan—The Aims of Geographical Education—The Submerged Trees of the Columbia River—The Melanesian Races and Languages—St. Petersburg Letter—Halos at Denver—Plea for a Civilian Control of the U. S. Weather Bureau—Honolulu Letter (notices beginning of work to establish the latitude of the islands)—The Study of Geography—The Hupa Indians (N. W. California).

PARIS.—*Annales de l'Extrême Orient*, Déc., 1886.

Susiana and the Ruins of Ancient Persia—The Climate of Tonkin—Burmah and China—Arabic Physicians in the Barbary States—Notes—Communications.

Le Tour du Monde, Déc. 25, 1886—Fév. 12, 1887.

Luzon and Palawan—Geographical Review—From Saïssansk to Tibet and the Sources of the Hoang-Ho—Through Alsace and Lorraine.

Revue de Géographie, Déc., 1886–Jan., 1887.

On the Relations between the Populations and the Climate on the European Shores of the Mediterranean—The Topographical Society and the School of Geography—On the Constitution of Geographical Science—Topography Applied to the Colonization of the Western Coast of Africa—The Geographical Movement—*Mémoire* of the Chevalier de Razilly to Cardinal Richelieu—The International Geographical Alphabet—Fiji Islands—Recent Topographical Works on Madagascar—General Cartography of Morocco—The Geographical Movement—Geography before the Sorbonne at the Salle Gerson—An Application of Geography to History—A New Method of Historical Investigation—Correspondence and Critical Reports of Geographical Societies and Recent Publications.

Revue Géographique Internationale, Nos. 133–134.

From Blida to Bona by Way of Algiers and Constantine—Irrigation in the Roussillon—The Inhabitants of Surinam—Remedial Measures to be Adopted in Algeria for the Present Condition of the Forests—Application of the *Torrens Act* to Tunisia (act for simplifying and registering titles and transfers of real estate)—Franco-Chinese Treaty of Commerce—Present State of Madagascar—The Mulattoes and the Creoles in Martinique—The Winds at Vivi, Malanjé, and Loanda—Transformations and Importance of Bagamoyo (25 miles from Zanzibar)—The Uapé, and the Women of the Amazon—English

India—The Southern Hemisphere—Economical Notes on Italy (by Leon Say)—Expeditions of the Upper Senegal and the Niger: Campaign of 1885–1886—Geographical Record and Report of Explorations—Obituary: Paul Bert—Bibliography—France Abroad—The Railroad of the Central Pyrenees—Mixed Marriages in Algeria—The Hova Ministers and the French Resident—The Whites in Martinique—Rain on the Congo at Different Seasons—France in the Mediterranean—The Canal between the Atlantic and the Mediterranean—Report of Explorations—Obituary Notices—Bibliography.

Gazette Géographique et L'Exploration, 16 Déc., 1886–Fév. 10, 1887.

French Colonization in Tunisia—Dr. Ten Kate's Travels in Guiana and Venezuela—Madagascar—Colonial Affairs of France—Foreign Colonial Movements—News—Commercial and Statistical Notes—Review of the Societies—On Transcription of Geographical Names—Lake Assal—French Mission in Central Asia—Colonial Affairs—News and Notes—Obituary: Dr. Fischer—Notes on Obock, Sept., 1886—The Courbet Archipelago—Emigrant-Guide to the French Colonies—African Explorations in 1886—French Colonial Affairs—Foreign Colonial Affairs—News—Notes—Reviews—Geographical Indicator (a List of Articles in Journals)—Archipelago of the Azores and Madeira Island—French and Foreign Colonial News—Geographical News—The Port of Havre—A New

Explorer in Siamese Laos—The Panama Canal :
 Opinion of an English Consul—Tierra del Fuego
 —De Brazza's Work—Colonial Affairs of France
 —Foreign Colonial Affairs—Geographical News
 —Commercial and Statistical Notes—Massowah
 in 1886 — Geographical Progress in 1886 —
 French Colonial Affairs—Foreign Colonial Af-
 fairs — Geographical News — Commercial and
 Statistical Data — Societies — Bibliography —
 Province of Phuyen (Annam)—Commercial In-
 stitutions of Hamburg—Argentine Bureaux of
 Information — French and Foreign Colonial
 Matters—Geographical News—Commercial and
 Statistical Data — Societies — The Incident of
 Dongaréta (on the Somali Coast, near Zeylah)
 —Exploration in 1886—The Expedition for
 the Relief of Emin-Bey—New Caledonia and
 the New Hebrides — Colonial Affairs—News
 and Notes—Societies—France in N. Africa—
 A Letter of Anselme Régner—Dr. Junker—
 Colonial Affairs — Geographical Matters —
 Societies.

Société de Géographie Commerciale, Tome viii., 4e Fasc.

Journey across South America — Notes on the
 Regency of Tunis—Notes on the Commerce
 of the Somalis, the Harrar, and the Galla Coun-
 try—Among the Bangallas — Means of Aug-
 menting the French Exports to the Far East
 —The New Penitentiary Establishment at Sin-
 gapore—Report on the Prizes for 1885—The
 Canadian Labrador — Azerbaijan—The Erup-
 tion of Krakatao—New Zealand and Its Ports

—The Ramie Fibre in the Low Countries and in Netherlands-India — Canadian Emigration — Researches Made and yet to be Made on the Fate of La Pérouse—The Brahmapootra and the Irrawaddy — The Labor Question among the Chinese—The French in Russia — Postal and Telegraphic Stations in Indo-China — Correspondence — Reports — Bibliography—Condition of the Society on the 1st of Oct., 1886—Geography and Resources of Chile—Modern Greece and Its Productive Forces—Jamaica—Exhibition of Chilian Products—The Island of Tahiti—The Prussians at Arguin (W. Coast of Africa)—French Occupation of the New Hebrides—Travelling Photography—Gold Mines of Western Australia—Correspondence—Meeting of October 19th—Bibliography.

Le Canal de Suez, 22 Déc., 1886, et Janv. 2, 12, 1887.

Comparative Receipts and Movement of Ships, 1884, 1885, 1886—Classification by Flags—Commerce of Burmah—Reports from Ismaïlia and Port Saïd—Forty-Sixth Annual Report of the P. and Oriental Co.—Number of Passengers and of Ships for the Third Quarter of 1886—New Line of Russian Steamers from Odessa to the Far East—Review of the Year 1886—Progress of Ceylon—Agreement of Dec. 26, 1886, between the Canal Co. and the Egyptian Government for the Cession by the Latter of 4,000 Hectares (nearly 10,000 Acres) on the Line of the Canal—Commerce and Navigation of Bangkok

—Ismailia and Port-Saïd—Progressive Improvements of the Canal—Night Transit—Italy in the Red Sea.

Société de Géographie, Compte Rendu, 18–19, 1886–1887.

Correspondence : Organization of the National Geographical Congress at Havre in 1887 ; Centenary of Arago ; Present of Humboldt's Photograph with Autograph Inscription, from Aristarchi Bey ; Proposal to Erect a Monument to Tavernier, and to Put a Tablet on His House at Paris ; The North of Asia the Cradle of the Human Race ; Proposition to Explore the Region of the Zambesi to the South—Communications : Labonne's Voyage to Iceland—Excursion to Cape St. Vincent and Cape Sagres (Prince Henry the Navigator's School)—Correspondence : Notices of decease of Messrs. Emile Guillot, Béguyer de Chancourtois, and A. Géés ; Notice of Appropriation by the State for the Publication of M. Dutreuil de Rhins's Map of Tibet ; Letter Enclosing a Map of Siam, by Father Lombard, Missionary ; Letter from the Count of Saint-Saud, giving an Account of his Excursion to Andorra, with Measurements of Peaks ; Letter on Mr. Feddersen's Exploration of the Geyser Valley in Iceland ; Communication from Dr. Rouire on the Region of Lake Kelbiah ; and from Mr. Opigez on New Caledonia—Remarks : by M. Joseph Martin, on Eastern Siberia ; by Mr. W. Huber on the Tunnelling of the Simplon—Contributions made to the Society—Extract : from the Travels of Bonvalot, Capus, and Pépin

in Central Asia—Journey from Reshd to Hamadan—Note on Dr. Rouire's "Hydrographic Basin of Central Tunisia"—Note on Dulceri's Catalan Map, dated 1339—Report on the Simplon Tunnel (by M. W. Huber, expert)—Correspondence—*Portolani* in the Library of Arcachon—Western Sahara (Spanish Exploration)—Destruction of Arabic Antiquities at Tlemcen—Explorations of Dr. Junker—Sources of the Orinoco—Subscription for Mdle. Pavy—M. Garassut's Cosmograph (Instrument for Teaching Cosmography)—Increase of Population in France and the Principal Countries of Europe.

Bulletin, 4^e Trimestre, 1886.

Notes to Accompany the Maps of the Ogowé River (in the Bulletin)—The Island of Fernando Po and Its Present Condition and Inhabitants—Notes on the Strong Places of Bouda (in the Algerian Sahara)—Notes on Tonkin—Muong Tonkin (Country on the Western Border of Annam)—Gen. de Bussy's Expedition in the Decan in the Eighteenth Century.

PHILADELPHIA.—*The American Naturalist*, Dec., 1886.

The Scallop and Its Fishery—Super-Metamorphism and Vulcanism—Zoic Maxima—The Peabody Museum's Explorations in Ohio—An Interesting Connecting Genus of Chordata—General Notes.

ROME.—*Società Geografica Italiana, Bollettino*, Dic., 1886—Genn., 1887.

Proceedings—On the Movement of Emigration from Italy, with Its Causes and Its Characteristics—

Criticisms of German Geographers on Capt. Cecchi's Work (From Zeila to the Frontiers of Caffa)—Nissen's Italian Geography—Notes and Remarks—Bibliography—Proceedings—Italian Posts and Territories in the Red Sea—Cota Rajá, Oleleh, and Nias Island (W. Coast of Sumatra)—Summary of the Sixth International Congress of Americanists—Notes from South Africa—Agram to Serajevo—Notes—Articles in Italian and Foreign Journals.

ROUEN.—*Société Normande de Géographie*, Sept.–Oct., 1886.

Voyage to Panama—Voyage of Exploration in the Malay Peninsula—Obituaries: Paul Soleillet, the Marquis de Blosseville—Correspondence and Geographical News—Bibliography.

SAN FRANCISCO.—*Kosmos: The Official Organ of the Geographical Society of the Pacific*, Feb. 1, 1887.

Nature, Science, and Art—Proceedings of the Geographical Society of the Pacific—Ascent of Mt. St. Elias (by Mr. Seton-Karr)—Mansion of J. C. Flood—Submarine Valleys on the Pacific Coast of the United States (by Prof. George Davidson)—California Pioneers—Miscellaneous.

STUTTGART.—*Ausland*, 13 Dez., 1886–31 Januar, 1887.

The Germans in the Bukovina—Malta—The Mouth of the Mississippi—The Ancient Cosmogony of the Great Russians—Geographical News—Shorter Communications: West Australia, and a Newly Discovered Lake on the Spanish Frontier—Literature—The Geological Collections of

the United States—The Philippine Islands—Mythical Elements in Roumania—North American Sketches—The Snake-Dance of the Moquis in Arizona—Smaller Communications: Latest News of Emin-Bey—Notes—Personal—Useful Plants of Damara-Land—White Slaves in Galicia—Dr. Ten Kate's Travels in Guiana—The Nicaragua Lake and Canal—The First Night-Transit through the Suez Canal—Geographical News—Literature—Labors with the Mattock (in Krain, between Carinthia and Styria)—A Russian Traveller in India—The Fitness of Europeans for Acclimatization in Tropical Lands—Stanley's New African Expedition—The Krischaná Indians (on the River Jaupery, in the Amazonas Province)—Geographical News—Gustav Wallis's Travels in Brazil, 1860–1862—Literature—The Moon-Superstition in the Austrian Coast-Lands—Life in a Small Oriental State on the Russian Frontier—Female Infanticide in India—Geographical News—Short Communications—Capture of Stanley Falls—The Ruthenians (Red Russians) in Bukowina—Sketches of Séoul—The Summer Outing in the United States—Obock and the French Protectorate over Tadjura and the Adjoining Regions as Far as Gubbet-Karab—Geographical News—The Guanahani Question—The Escorial—The Cobra in India—The Origin of the Gallas—News—Literature—The Sudden Appearance of New Stars and Their Significance for the History of the Earth's

Development—The Cameo-Industry of Italy
—Travelling in Tibet—A Russian Traveller
in India — Traditions of Nias Island — Geo-
graphical News — Gustav Wallis's Travels in
Brazil.

TOULOUSE.—*Société Académique Franco-Hispano-Portu-
gaïse*, Avril-Juin, 1886.

Minutes of Meetings in March-May, 1886—From
Buenos-Aires to Mendoza.

TOURS.—*Société de Géographie, Revue*, Nov.-Dec., 1886.

Letters from Senegal—Notes on Tonkin—Geographi-
cal Echoes—Varieties—Proceedings—Mr. West-
mark's Journey to the Cannibals on the Upper
Congo—Report on the Meeting of the French Al-
pine Club in Algeria—Proceedings—Obituary.

TURIN.—*Cosmos*, vol. viii., x.-xi.-xii.

Auser, Arno, and Serchio at Pisa — Nachtigal's
Travels in the Sahara and in the Soudan—The
Society Islands and the Natives of Polynesia
—Ethnology of the Egyptian Soudan — The
Northern Hedjaz between El-Wedj, Medina,
and Bedr Honain — Reconnaissance of the
Itinerary between El-Wedj and Yanbo el Bahr
and the City of Medina—Italian Mission from
Tangier to Morocco and Mogador—Geographical
Record.

VIENNA.—*Monatsschrift für den Orient*, Dec., 1886–15
Jänner, 1887.

Slavery and the Slave-Trade in East-Africa and
on the Red Sea—Metal Work (in Japan)—
Religion, Arts, and Manufactures among the
Cameroon People—Ancient Satsuma Faïence—

A Human Sacrifice in Rajpootana—Measures against Chinese Immigration in Australia—A Mountain of Salt in Palestine—Programme of Lectures at the Oriental Museum—Study of the History, Imperial and Legal, of Japan—Native Peoples of Oceania, America, and Asia—Labor Associations in China—Out of New Japan—Sierra Leone—The Northern Baltic Commerce of the Arabs in the Middle Ages.

Deutsche Rundschau für Geographie und Statistik, 3 und 4 Hefte, ix. Jahr.

On Relative Population and Its Representation on Maps—Voyages to Corea—Pictures from New Zealand—Puerto Cabello—Astronomical and Physical Geography—Political Geography and Statistics—Brief Communications from Abroad—Famous Geographers, Naturalists, and Travelers—Obituary: Paul Soleillet—Geographical and Related Societies—Bibliography—The Peoples of the German Cameroon Country—Ethnographical Significance of the Extension of Military Duty in the Caucasus—West Indian Intelligence—Formation of Coral Reefs—Statistics of the Saxon Population in Siebenbürgen—The Political Classification and the Larger Towns of the Prussian Province of Hanover—Population of German Towns in the Middle Ages—Postal and Telegraphic Service of England in 1885–1886—Census of Algeria—The Railway and Telegraph Network of Brazil—Notes—Paul Güssfeldt—Obituary Notice: Dr. Fischer—Societies—Bibliography.

Mittheilungen der K.-K. Geographischen Gesellschaft,
Band xxix., No. 12.

The High Lakes of the Eastern Alps—The Station of Stanley Falls—The Population of Bosnia and the Herzegovina—Arabic Information in the Twelfth Century on the Commercial Roads through the Balkan Peninsula—Periodical Geographical Literature in the first Six Months of 1886—Geographical Literature—Monthly Meeting of the Society in December, 1886.

WASHINGTON.—*Philosophical Society, Bulletin*, vol. ix.

Physico-Geographical Divisions of the Southeastern Portion of the United States and Their Corresponding Topographical Types.

WILKES-BARRE, PA.—*Wyoming Historical and Geological Society, Proceedings*, vol. iii.

Introductory Note—Proceedings: Resolutions, Biographical Sketch, Brief Review, Literary Work of Harrison Wright, Ph.D., Poem—Luzerne County Bar-Proceedings, Resolutions of Trustees Osterhout Free Library, Historical Society of Pennsylvania—Proceedings.

WORCESTER (MASS.).—*American Antiquarian Society, Proceedings*, vol. iv., part 3.

Proceedings at Meeting—Report of Council: The Connection of Massachusetts with Slavery and the Slave-Trade—Reports—Donors and Donations—Archæological Research in Yucatan.